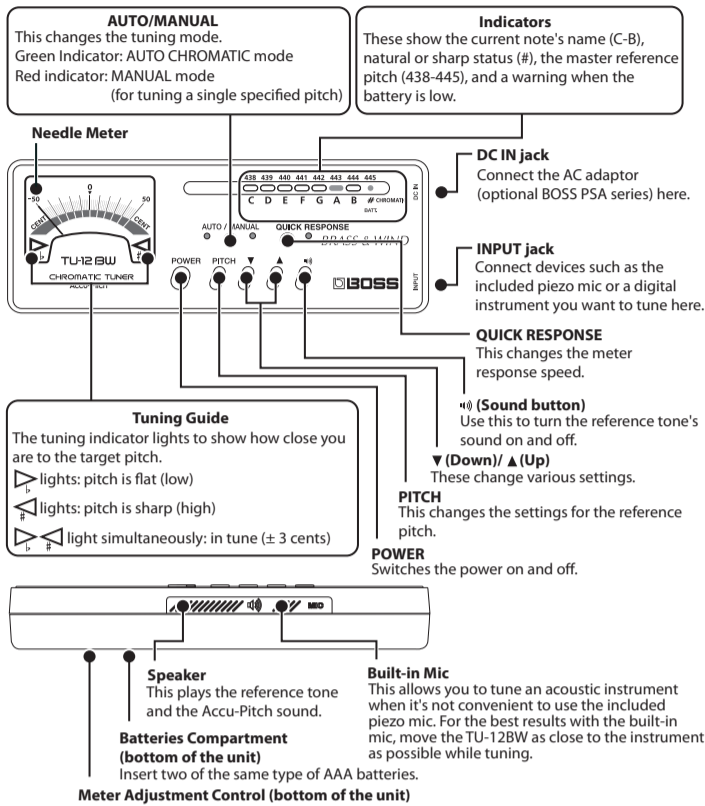


## Owner's Manual

Thank you, and congratulations on your choice of the BOSS TU-12BW Chromatic Tuner. Before using this unit, carefully read the sections entitled: "USING THE UNIT SAFELY" and "IMPORTANT NOTES" (supplied on a separate sheet). These sections provide important information concerning the proper operation of the unit. Additionally, in order to feel assured that you have gained a good grasp of every feature provided by your new unit, this manual should be read in its entirety. The manual should be saved and kept on hand as a convenient reference. As shipped, the TU-12BW's batteries are not yet installed. Be sure to read the section "Changing the Batteries," and then follow the instructions to install the batteries. **Copyright © 2008 BOSS CORPORATION**  
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### Normal Tuning (AUTO CHROMATIC Mode)

1. **Connect the plug of the included piezo mic to the INPUT jack and mount the piezo mic on the instrument you want to tune.**

To carry out tuning using the built-in microphone, connect nothing to the INPUT jack and place the TU-12BW close to the instrument. If you have a digital wind controller or an instrument with a built-in mic or pickup, plug its output into the INPUT jack.

2. **Press [POWER] to switch the power on.**
3. **Press [AUTO/MANUAL] to enable the "AUTO" setting (lighting the green indicator).**

In AUTO CHROMATIC Mode, the TU-12BW automatically displays a note's pitch (the note name) as you play it on the instrument. Most of the time, AUTO is the most convenient mode to use.

**MEMO** When you want to practice producing a specific pitch, you may want to use MANUAL mode; in this mode, only the pitch that you specify is detected and displayed.

4. **Play a single note on the instrument.**  
While the note is sounding, the name for the note's current pitch is displayed. The meter and Tuning Guide show how far the note is from the correct pitch.
5. **Tune the instrument.**

With the intended note name displayed, tune the instrument so that ▶ and ◀ on the Tuning Guide light simultaneously and the meter's needle points to 0 (the center position).

When the Accu-Pitch feature is on, the tuner makes a beeping sound when the note is stabilized at the correct pitch, informing you that the note is in tune.

### Training for a Specific Pitch (Tuning in MANUAL Mode)

1. **Connect the plug of the included piezo mic to the INPUT jack and mount the piezo mic on the instrument you want to tune.**

To carry out tuning using the built-in microphone, connect nothing to the INPUT jack and place the TU-12BW close to the instrument. If you have a digital wind controller or an instrument with a built-in mic or pickup, plug its output into the INPUT jack.

2. **Press [POWER] to switch the power on.**
3. **Press [AUTO/MANUAL] to enable the "MANUAL" setting (lighting the red indicator).**

4. **Press [▼] or [▲] to display the note name for the specific pitch you want to practice and/or tune.**

5. **Play a single note on the instrument.**

The meter and Tuning Guide show how far the note is from the correct pitch.

6. **Tune the instrument.**  
With the intended note name displayed, adjust the instrument's tuning so that both ▶ and ◀ on the Tuning Guide are lit and the meter's needle points to 0 (center position).

When the Accu-Pitch feature is on, the tuner makes a beeping sound when the note is stabilized at the correct pitch, informing you that the note is in tune.

### TU-12BW Settings

#### Changing the Reference Pitch for Tuning

1. **Hold down [PITCH] and press [▼] or [▲] to choose the reference pitch you want.**  
The indicator flashes. Choose the reference pitch you want by getting it to flash.
2. **Release [PITCH] to set the selected reference pitch.**

**MEMO** This setting is saved in memory when the TU-12BW is powered off.

#### Tuning While Listening to the Reference Tone (Sound Mode)

1. **Choose the tuning mode you want to use (AUTO or MANUAL).**
2. **Press [Ⓜ] (Sound) to play the reference tone.**
3. **Press [▼] or [▲] to light the indicator for the note name you'd like to use as a reference.**

The sound of the note name shown by the indicator is played.

**MEMO** Pressing [▼] and [▲], you can play reference tones in half-step increments over five octaves (C2 to C7).

4. **Tune the instrument to the reference tone.**  
**MEMO** When you're using Sound mode, tuning cannot be performed using the built-in mic (the built-in mic is disabled).
5. **Press [Ⓜ] (Sound) to stop playing the reference tone.**

#### Changing the Meter Response Speed (Quick Response Feature)

The Quick Response feature increases the speed of the meter's response to the incoming pitch. You may find this handy for some advanced music practice applications.

1. **Press [QUICK RESPONSE] to turn the Quick Response feature on/off.**  
Quick Response is activated when the red indicator lights.

### Calibrating the Meter's Needle

Rarely, the meter's needle may drift out of calibration, causing the needle to point slightly off from the 0 position even when the Tuning Guide's ▶ and ◀ indicators light simultaneously. This can occur over time as the unit is transported, or if the unit is handled in a rough fashion. If this occurs, you can recalibrate the needle using the following procedure.

**MEMO** During normal use, the meter's needle almost never drifts out of calibration. To adjust it, be sure to use a small Phillips screwdriver (a 2.3 mm precision screwdriver).

1. **Hold down [PITCH] and turn the power on.**  
Confirm whether or not the needle is pointing at the 0 position.
2. **If the needle is not pointing to 0, carefully turn the adjustment screw with a small, precision phillips screwdriver (2.3 mm) until the needle points to 0.**
3. **After completing calibration, press [POWER] to switch off the power.**

### Useful Features

#### Preventing Battery Drain If You Forget to Switch Off the Power (Auto Power Off Feature)

When the TU-12BW is turned on and powered by batteries, the power is turned off automatically if approximately 30 minutes passes without any button being pressed.

#### Deactivating the Auto Power Off Feature

You can temporarily deactivate the Auto Power Off feature when you power up the TU-12BW. To do so, simultaneously hold down [▼] and [▲] while you press [POWER] to turn on the power.

The Auto Power Off feature is always enabled when you switch on the power in the usual way.

#### Using a Tone to Indicate Tuning is Completed (Accu-Pitch Feature)

When the Accu-Pitch feature is on, a beeping sound is played when the pitch of the instrument you're tuning stabilizes within a range of three cents above or below the correct pitch. This sound tells you that the pitch is in tune.

#### Switching the Accu-Pitch Feature On and Off

1. **Hold down [Ⓜ] (Sound) and press [POWER] to switch on the power.**  
If no sound is heard from the unit as it's powered up, it means that the Accu-Pitch feature has been deactivated. To enable the Accu-Pitch feature, perform the same operation again; if you hear a beeping sound when the power comes on, it means that Accu-Pitch has been enabled.

### Memory Features

Once batteries are installed in the TU-12BW, the settings described below are retained in memory even after the power is switched off.

**MEMO** Removing the batteries returns all settings to their factory defaults.

Setting	Original factory settings
Tuning mode setting (AUTO or MANUAL)	AUTO
Reference pitch	440Hz
Note name selected in Sound mode	C4
Accu-Pitch feature settings	ON (enabled)
Quick Response feature settings	OFF (disable)

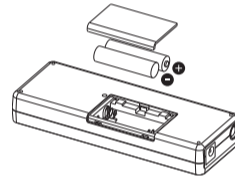
### Changing the Batteries

The BATT. indicator flashes when the batteries begin to run down.

Replace the batteries as soon as possible.

\* When turning the unit upside-down, place it on a soft cloth or the like so as to prevent damage to the panel.

1. **Open the battery compartment (located on the bottom of the unit) by sliding the cover toward OPEN.**
2. **Remove the old batteries from the battery compartment.**
3. **Insert two of the same type of fresh AAA batteries.**  
\* Make sure the "+" and "-" ends of the batteries are oriented correctly.  
\* Do not mix fresh batteries with used ones, or mix batteries of different types. Doing so can result in fluid leakage.
4. **Slide the cover of the battery compartment back into place.**



### Specifications

<b>Tuning Range</b>	E0 (20.6Hz) – C8 (4,186.0Hz)	<b>Expected battery life under continuous use (carbon)</b>	Approximately 15 hours This figure will vary depending on the actual conditions of use.
<b>Reference Pitch</b>	A4 (438–445Hz)	<b>Dimensions</b>	147.5 (W) x 54.0 (D) x 23.9 (H) mm 5-13/16 (W) x 2-1/8 (D) x 1 (H) inches
<b>Tuning Accuracy</b>	± 1 cent	<b>Weight</b>	205 g, 8 oz (including batteries)
<b>Power Supply</b>	Dry battery R03 (carbon) or LR03 (alkaline); (AAA) type x 2; DC 3 V AC adaptor DC 9V (PSA series; optional)	<b>Accessories</b>	Dry battery (R03 (AAA) type) x 2 (carbon), piezo microphone, Owner's Manual, Soft Case, Holder, Leaflet ("USING THE UNIT SAFELY" and "IMPORTANT NOTES"), Information
<b>Current Draw</b>	12 mA		

\* In the interest of product improvement, the specifications and/or appearance of this unit are subject to change without prior notice.